Before the

Federal Communications Commission

Washington, D.C. 20554

In the Matter of	)	
	)	
Modernizing the E-rate	)	WC Docket No. 13-184
Program for Schools and Libraries	)	

INITIAL COMMENTS OF WASHINGTON STATE OFFICE OF SUPERINTENDENT OF PUBLIC INSTRUCTION REGARDING

FURTHER NOTICE OF PROPOSED RULEMAKING

The Washington State Office of Superintendent of Public Instruction submits the following comments in response to the FCC's Further Notice of Proposed Rulemaking to modernize the E-rate Program for Schools and Libraries.

The Office of Superintendent of Public Instruction (OSPI) is the state's department of education. The department has statutory oversight for our state's 295 public K-12 school districts, located in over 2,200 school buildings. We serve more than 1 million students.

We recognize the great value of the E-rate program and provide the technical support districts need to maximize their discount advantage. At the national level, our staff are active in the State E-rate Coordinators' Alliance, State Education Technology Director's Association, Council of Chief State School Officers and the Education Information Management Advisory Consortium.

We appreciate the opportunity to comment on this important Further Notice of Proposed Rulemaking (NPRM) released by the Commission on July 23, 2014.

Connectivity Targets *(FNPRM, section 26)*

We strongly support the FCC's proposal to:

- Establish minimum broadband infrastructure goals to provide:
  - High-speed broadband connectivity to the school district;
  - High-capacity bandwidth to each school within a district;
  - Local area connectivity to every classroom; and
  - Internal connectivity, including Wi-Fi, throughout all learning spaces.
- Base the goal on the specific need within each school, using SETDA's suggested level of 100 mbps per thousand students by 2015 and 1GB by 2020.

Consortium Discount Rate Calculations *(FNPRM, section D.1)*

We applaud the Commission's commitment to encouraging consortia participation, and strongly agree that consortia purchasing can significantly drive down the prices of e-rate supported services (285). The state of Washington has been committed to this model since 1996, when we first developed the K-20 Education Network. Through bulk purchasing and the leveraging of strategic partnerships, we have been able to meet the ever-increasing needs of our members for significantly less than it would cost to serve these locations individually.

We disagree, however, with the assertion in paragraph 287 that "By using the weighted average, consortia should be better able to allocate the funding according to each applicant's own discount rate." In the case of the State of Washington, moving to a weighted average would lower the statewide discount from 72% to 66%, which would lead to a loss of funding for the state, and the likely departure of currently connected sites. An explanation of this is provided below for your review:

The current discount matrix clearly supports the idea that rural areas are often more expensive to serve, and mitigates this by providing an extra 5% - 10% discount to rural locations with NSLP qualification levels of 50% or less. This urban/rural distinction in the matrix essentially helps to 'weight' the small, rural locations a bit more, by providing an extra discount for which their urban counterparts do not qualify.

In the State of Washington (and many other states), populations in our rural districts are significantly smaller than in our urban districts. The below table shows that, while rural school districts serve only 18% of the population of the state, they represent 64% of the total districts.

	RURAL	URBAN
Number of Districts	189 *(64%)*	106 *(36%)*
Total Number of Students	190,242 *(18%)*	863,604 *(82%)*
Average Number of Students	1007	8147
Average E-rate Discount	76%	62%

In addition, the average urban district serves more than eight times the number of students than the average rural location does, but the cost to serve the rural location is generally more than the cost to serve its urban counterpart. This cost gap is tied to basic network economics: as district size increases, neither fixed costs (e.g., installation) nor marginal costs of service increase at anything close to a linear rate. In addition, both the fixed and marginal-cost structures tend to be higher in rural areas than urban ones.

These distinctions are important when considering moving to a weighted model, as weighting of averages is generally seen as a more accurate way to represent a given population, but only *if all other factors are equal*. We believe that using student count as a measure of 'weight' in this model is flawed, and examples from our statewide consortia should highlight this:

Of the 295 districts in the state, 272 are connected to the state's education network (connecting 92% of the state's student population). The network provides a single point of connectivity to each district – regardless of student count, discount level, or number of schools within the district. So, while the 22 largest connected districts serve nearly 50% of the connected population, they represent nowhere near 50% of the network's operating expenses.

If one looks at the monthly recurring cost for the tail circuits that serve the 22 largest districts connected to the statewide network, and compares them to the MRCs for the 22 smallest districts, this starts to become clear:

	total students served	Number of K-20 circuits	total MRC for tail circuit connections
22 largest districts	482,049 *(49.9%)*	22	$45,250
22 smallest districts	712 *(0.07%)*	22	$40,684

By using a student population basis for weighting the average, the students served by 22 individual connections (8% of districts connected) would provide the basis for *half* of the calculation of the statewide discount.

When coupled with the lower discount rates of these sites, and the higher cost to serve per student at the smaller locations, we believe a weighted average based on student count does not reflect the true costs. Thus, we fear that there is a fundamental flaw in the Commission's stated position in paragraph 271 that "Using a weighted average of the discount rate of all consortium members should reduce the risk that any one member's discount rate is greatly different than if the member did not join the consortium".

If the Commission were to implement the proposed change to a weighted discount calculation for consortia, it would lower the statewide discount from its current 72% to 66%. This would not only fail to encourage consortia participation, but would lead to a significant loss of funding for the state, and the likely departure of currently connected sites.

Additional Ways to Encourage Consortium Participation *(FNPRM, section D.2)*

We support the possible change in the discount for consortia, and believe that applicants are more likely to form consortia if an additional 5% discount were provided. We also agree that it is reasonable to require demonstrated effectiveness in lowering prices as a condition of any additional consortium discount.

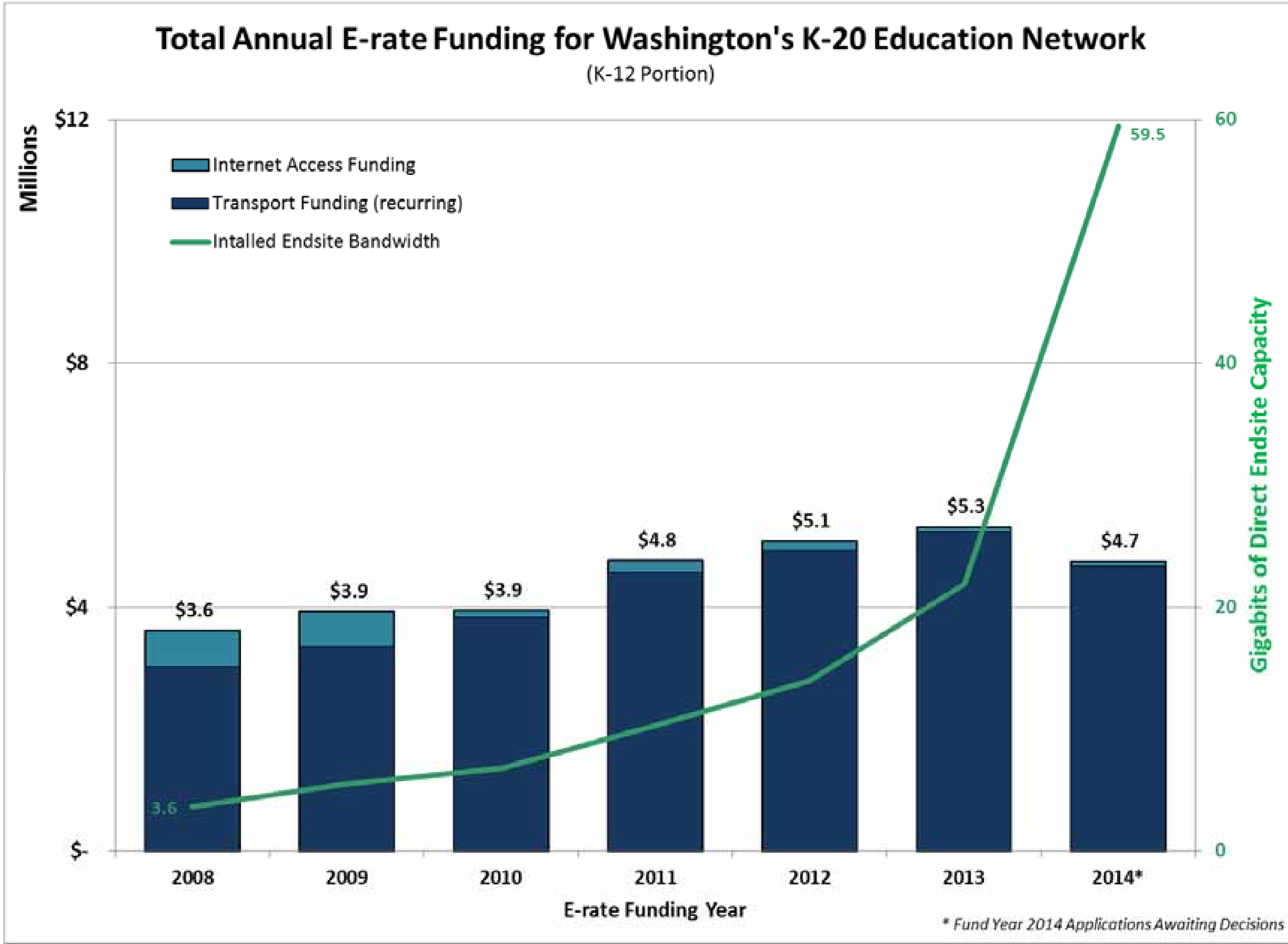
We support the Education Coalition's proposal that qualifying consortia receive an additional 5% discount (294), specifically as this relates to statewide applications. If the Commission were to adopt this new standard as proposed:

1. Serve at least 30 percent of the students in a state, include at least 30 percent of the local education agencies in the state, or be designated as a consortium by the state
2. Document the participation of individual entities
3. Maintain a level of governance
4. Perform large-scale, centralized procurement that results in master contracts
5. Open participation to all eligible schools and libraries, including public charter schools and private schools.

We would be supportive, but with the following comment:

5. As long as participation is not mandated, and the state can charge all non-discount costs to the entity, including shared costs on statewide backbone, etc. Our connected institutions currently receive an additional subsidy from the State, and this would not be available to private schools, so they would pay a different amount to join the network than public schools.

With this caveat, we are strongly in favor of new rules that would encourage consortia through greater discounts. We believe this is also a way to reward large consortia for their ability to lower the pre-discount costs so significantly. Any steps that can be taken to continue to encourage the lowering of *pre*-discount costs will then lead to a smaller draw on the fund itself, even if the discount percentage itself goes up. As stated earlier, we believe that statewide consortia are uniquely able to bring these total costs down (see the graphic on the next page).



Total Annual E-rate Funding for Washington's K-20 Education Network
(K-12 Portion)
Millions
$12
$8
$4
$-
Internet Access Funding
Transport Funding (recurring)
Intalled Endsite Bandwidth
$3.6
$3.9
$3.9
$4.8
$5.1
$5.3
$4.7
3.6
59.5
60
40
20
0
Gigabits of Direct Endsite Capacity
2008
2009
2010
2011
2012
2013
2014*
E-rate Funding Year
* Fund Year 2014 Applications Awaiting Decisions